

REMARKS

Applicants respectfully request reconsideration of the above identified application. Claims 1-46 are pending. Claims 1-46 are rejected.

The remaining comments are directed to Claim 1-46. The Office Action mailed on August 26, 2003 rejects Claims 1-46 under 35 U.S.C. 102(e) as allegedly being anticipated by Bourekas, U.S. Patent 6,598,050.

The Examiner states with respect to Claims 1-3, 5-10, 12 and 31-34 that, "Bourekas discloses a method, executable code and processor for transparently sharing virtual address translations, by accessing a translation and identifying if it is sharable...the global bit 115 and group membership fields 118 identify if the translation is sharable, and if so by the current task, as this procedure is transparent to the OS... requires no traps and therefore no modification of or special support by the OS;" with respect to Claims 13-15, 19-22 and 28-30 that, "Bourekas discloses processors and multiple logical processors as recited, since multiple tasks/processes are described;" and with respect to Claims 24-27, 35-36, 40 and 42-46 that, "Bourekas discloses that the TLB stores the indication."

Applicants respectfully disagree with the Examiners assertions. Claims 1, 9, 13, 20 and 35 set forth operating-system transparent methods and apparatus to access a virtual address translation and transparently identifying if the virtual address translation is sharable.

Bourekas, on the other hand, discloses that, "With the use of a group membership field, the operating system can support three levels of access in a virtual to physical address translation. The operating system permits a global

translation, an individual translation and a group translation," (col. 5, line 65 through col. 6, line 2). The TLB of Bourekas determines if the current task may use a translation by matching the TLB group membership field and the group membership field in the virtual address (col. 4, lines 63-66). Applicant respectfully submits that wherein Applicant claims identifying if the virtual address translation is sharable, transparently to the operating system; Bourekas discloses the operating system explicitly identifying if the virtual translation is globally sharable, group sharable or not sharable. Therefore, if a particular operating system fails to explicitly identify that a virtual address translation is sharable, Bourekas does not disclose or suggest a method for transparently identifying it as such.

Accordingly in light of the argument presented above, Applicant respectfully requests the Examiner withdraw the rejection of Claims 1, 9, 13, 20 and 35.

Claims 31 sets forth a processor comprising control logic to identify a sharability status for a first translated address data and to provide a first sharing indication to indicate if the first entry may be shared.

Bourekas does not disclose or suggest control logic identifying a sharability for translated address data, but rather matches the TLB group membership field and the group membership field in the virtual address (col. 4, lines 64-66). Therefore, the group membership field of Bourekas is provided in the virtual address by the operating system, rather than being identified for translated address data by processor control logic.

Similarly, Claim 36 sets forth processor control logic comprising circuitry to identify a sharability of the first entry... and to provide a first sharing indication to indicate if the first entry may be shared. Claim 36 further sets forth

a sharing indication field in the first entry to store the first sharing indication provided by the control logic.

In contrast, both the global bit and group membership field stored in the TLB entry of Bourekas comes from the virtual address translation provided by the operating system (col. 5, line 65 through col. 6, lines 2), rather than from processor control logic. Applicant respectfully submits that Bourekas does not disclose or suggest processor control logic for identifying sharability or storing a sharing indication provided by the control logic as claimed by Applicant.

Therefore, Applicants respectfully submit that Claims 1, 9, 13, 20, 31, 35 and 36 are patently distinguished over the art cited by the Examiner. Applicants further believe that Claims 2-8, 10-12, 14-19, 21-30, 32-34 and 37-46 being dependent therefrom are also patentable. Applicants respectfully request the Examiner withdraw his rejection under 35 U.S.C. 102(e).

Applicants, therefore, believe that Claims 1-46 are presently in condition for allowance and such action is earnestly solicited.

CONCLUSION

Applicants respectfully submit the present claims for allowance. If the Examiner believes a telephone conference would expedite or assist in the allowance of the present application, the Examiner is invited to call Lawrence M. Mennemeier at (408) 765-2194.

Authorization is hereby given to charge our Deposit Account No. 02-2666 for any charges that may be due.

Respectfully submitted,

BLAKELY, SOKOLOFF, TAYLOR & ZAFMAN

Date: 11-26-2003

A handwritten signature in cursive script, appearing to read "Lawrence M. Mennemeier", is written over a horizontal line.

Lawrence M. Mennemeier

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